Two New Species of Cerambycidae from Southern California (Coleoptera)

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The Cerambycid genera Clytus Laicharting and Atimia Haldeman are each represented in California by four species or subspecies. In each case, three occur predominantly in the northern and central portions of the state. Two species, Clytus planifrons LeConte and Atimia confusa (subspecies dorsalis LeConte) have been recorded from throughout the Pacific coast region, and are the only species in either genus which are known to occur in California south of the Tehachapi Mountains. Intensive collecting in recent years in the San Gabriel and San Bernardino mountain ranges has produced new species in both genera, one of which, Atimia gannoni, described below, also occurs in the Sierra Nevada as far north as Tuolumne County.

Atimia gannoni, new species (Figs. 1 & 3)

Male.—Form moderately elongate, robust, only slightly tapering posteriorly; color black; vestiture coarse, appressed, luteus, with scattered long, erect, pale hairs on head, pronotum, elytra and undersurface of body. Head densely clothed with appressed hairs; vertex and frons densely, coarsely punctate, with glabrous, impunctate median line; antennae attaining apical fourth of elytra, scape moderately robust, subconical, more than twice as long as broad, third segment twice as long as second segment, fourth segment distinctly longer than third, fifth segment longest, outer segments subequal in length to third segment, cylindrical, not flattened nor expanded. Pronotum slightly wider than long, sides very feebly, obtusely rounded, widest before apex, subapical angles obtusely rounded; surface coarsely, regularly punctate medially, lateral punctures smaller, confluent to rugose, disk densely pubescent, pubescence obscuring surface, without impunctate or glabrous vittae; scutellum longer than broad, rounded posteriorly, densely pubescent. Elytra finely, irregularly punctate, with scattered large punctures, each with a single long erect hair, surface densely pubescent except for irregular denuded areas; denuded areas small, impunctate, pattern variable, usually consisting of an irregular, interrupted subsutural vitta, a postmedian spot and a vague, subapical oblique line; apices broadly, separately rounded or feebly subtruncate. Legs black, finely punctate, pubescent; posterior tarsi moderately broad, first segment shorter than follow-

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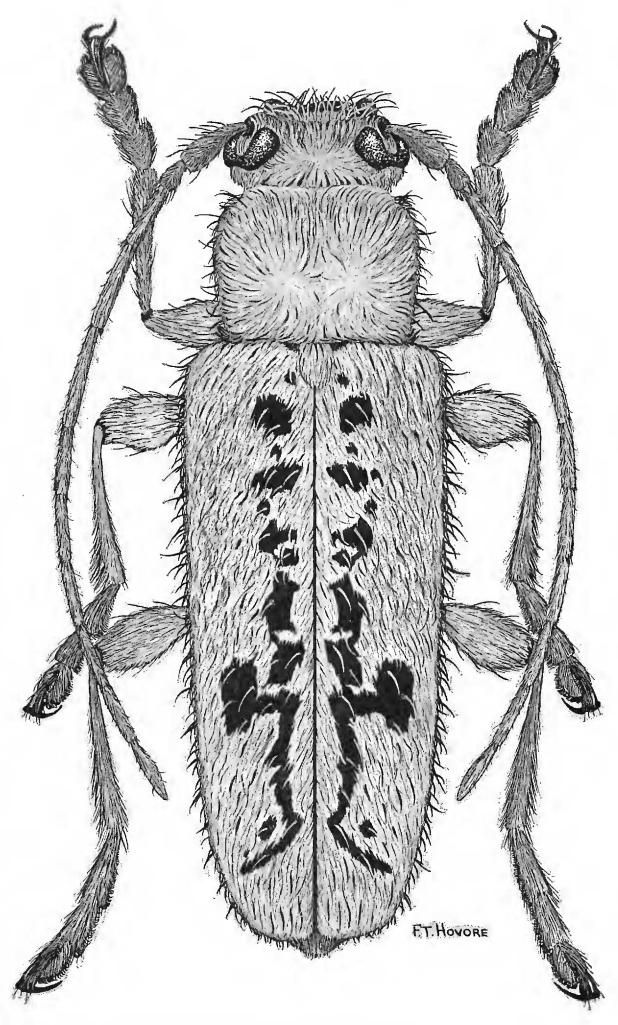


Fig. 1. Atimia gannoni Hovore and Giesbert, male.

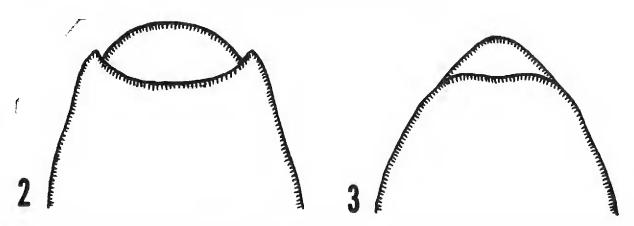
ing two together, second segment about one and one-half times as long as broad. *Abdomen* with sternites finely, closely punctate, densely pubescent, fifth tergite narrowly rounded at apex, fifth sternite feebly truncate or emarginate at apex (Fig. 3). Length: 7-9.5 mm.

Female.—Form larger and more robust than male; antennae slightly shorter, attaining apical one-third of elytra; pronotum with sides slightly more obtuse than in male; fifth abdominal tergite and sternite broadly rounded or subtruncate at apex. Length: 8–11 mm.

Holotype male, allotype (California Academy of Sciences) and 54 paratypes (37 males, 17 females), from Little Mt. Gleason, approximately 5 miles W MILL CREEK SUMMIT, LOS ANGELES COUNTY, CALIFORNIA, ex. pupal cells in Callocedrus decurrens (Torr.), 21 February 1971 to 27 March 1971 (F. T. Hovore, M. T. Gannon, E. Giesbert). Additional paratypes: 13 males, 4 females, same locality as holotype, 27 February 1971 to 6 March 1971, 25 February 1972 to 6 March 1972 (D. G. Marqua, A. E. Lewis); 1 male, 2 females, Fallsvale, 6000 ft, San Bernardino County, California, 1 February 1970 (F. T. Hovore). Also representing this species but not designated as paratypes: 1 male, Stevenson Creek, Sierra N. F., Fresno Co., Calif., 27 May 1915, "Libocedrus decurrens Lot 173" (R. Hopping Collection, California Academy of Sciences); 1 male, Long Barn, Tuolumne Co., Calif., 5 June 1931 (Van Dyke Collection, California Academy of Sciences). Paratypes are deposited in the collections of the following institutions and individuals: California Academy of Sciences; California Insect Survey Collection, Berkeley; Los Angeles County Museum of Natural History; California State Department of Agriculture, Sacramento; F. T. Hovore; E. Giesbert; D. G. Marqua; A. E. Lewis; J. N. Knull; W. T. Tyson; J. Cope.

Discussion.—The short third antennal segment, separately rounded or feebly truncate elytral apices and lack of pronotal polished areas readily separate Atimia gannoni from the described species of North American Atimia, with the exception of Atimia hoppingi Linsley. From A. hoppingi, to which it seems most closely related, A. gannoni may be distinguished by the coarser, denser, luteus, appressed pubescence (grayish-white in A. hoppingi), glabrous, impunctate median line on the vertex and frons, and the very feebly truncate or emarginate apex of the fifth abdominal sternite in the male (broadly, deeply emarginate in male A. hoppingi). (Fig. 2).

Atimia chinensis Linsley is known to us only from the original description of the female holotype (Linsley, 1939: p. 76, pl. 14, fig. 3), which seems to bear a strong superficial resemblance to A. gannoni. In addition to the considerable geographic separation (the type locality of A. chinensis is in Chekiang Province, China), females of A. gannoni differ from the description of A. chinensis in the black instead of dark brown integument, long erect hairs on the discal surfaces of the pronotum and elytra, denser appressed pubescence, and more elongate scutellum.



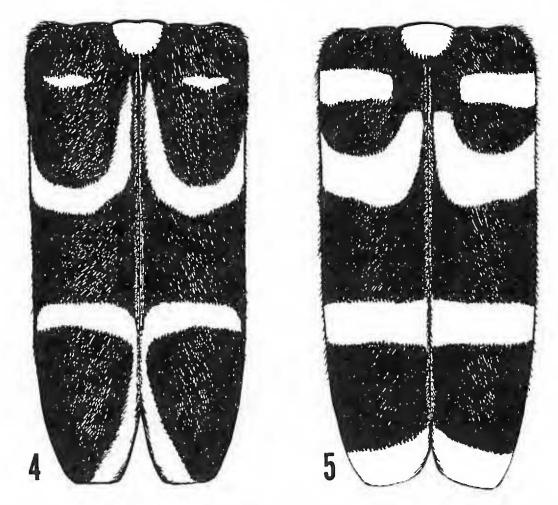
Figs. 2-3: Fig. 2. Atimia hoppingi Linsley. Ventral view, fifth abdominal sternite and tergite (pubescence and punctation omitted); Fig. 3. Atimia gannoni Hovore and Giesbert. Ventral view, fifth abdominal sternite and tergite (pubescence and punctation omitted).

Biology.— Atimia gannoni infests the thin outer bark of living or very recently dead Incense Cedar, most commonly in young trees, ranging from two to ten inches in basal diameter. Infested trees show no external signs of damage due to the presence of the Atimia. The larvae construct flat, meandering galleries, filled with fine reddish frass, in the recently dead layers of bark adjacent to the living inner bark tissues. The shallow, oval pupal cell is placed vertically, with the exit hole cut by the larva to the loose outer bark and plugged with a thin wad of stringy frass. Pupation and transformation probably occur in the late summer or fall since mature adults have been collected from their pupal chambers in February and March. The life cycle may require two or more years, as adults and several sizes of larvae have been found together in a single infestation. Atimia helenae Linsley has also been observed overwintering in both larval and adult stages (Frankie and Jensen, 1971), and from this evidence it has been suggested that A. helenae also has a two-year life cycle. It is also possible that A. gannoni, like Atimia confusa dorsalis (Linsley, 1936, 1939), is doublebrooded in the southern portions of its range.

This species is named for the late Michael T. Gannon, with whose valuable assistance much of the above material and observations were gathered.

Clytus chemsaki, new species (Fig. 4)

Male.—Form elongate, slender; integument piceous to black, legs and antennae dark brown; entire surface of body sparsely clothed with erect pale hairs; pronotum margined with a band of coarse, appressed, pale yellowish-white hair; pale pubescent pattern of elytra consisting of small, tranverse subhumeral bars, narrow, deeply arcuate, lunate antemedian fasciae, extending forward to sutural and



Figs. 4-5: Fig. 4. Clytus chemsaki Hovore and Giesbert, male elytral pattern. Fig. 5. Clytus planifrons LeConte, male elytral pattern.

lateral margins, transverse postmedian fasciae at apical third and oblique apical fasciae which extend anteriorly along suture to postmedian fasciae. Head coarsely, densely punctate, eyes and vertex margined with coarse yellowish-white hair; antennae extending over basal third of elytra. Pronotum slightly longer than broad, sides somewhat narrowly rounded, surface closely, coarsely punctate; mesepisterna and metepisterna clothed posteriorly with a dense patch of appressed pale hairs; pro-, meso-, and metesterna shining, sparsely clothed with pale appressed hairs; scutellum densely clothed with pale appressed hairs. Elytra slightly more than $2\frac{1}{2}$ times as long as broad, parallel-sided, surface shining, closely, finely punctate, clothed with fine, brownish, appressed pubescence except on fasciae; apices feebly truncate. Legs slender; femora feebly clavate. Abdomen with sternites shining, sparsely punctate, clothed with pale appressed pubescence; fifth sternite subequal in length to fourth, apex narrowly, evenly rounded. Length: 8–10 mm.

Female.—Form more robust than male, antennae slightly shorter; legs and basal antennal segments testaceus; pale appressed pubescence yellow; pubescent bands on pronotum wider than in male; undersurface of body more densely pubescent than in male; pronotum more broadly rounded at sides; abdomen with fifth sternite slightly longer than fourth, apex broadly, evenly rounded. Length: 7–11.5 mm.

Holotype male, allotype (California Academy of Sciences) and 12 paratypes

(2 males, 10 females), from Mt. Wilson Road, 5000 ft, Los Angeles County, California, 16 to 18 June 1971 (F. T. Hovore, E. Giesbert). Paratypes are deposited in the collections of the following institutions and individuals: California Insect Survey, Berkeley; Los Angeles County Museum of Natural History; F. T. Hovore; E. Giesbert.

Discussion.—Clytus chemsaki will key to C. planifrons LeConte (Fig. 5) in Linsley's (1964) key to North American Clytus. From C. planifrons it may be immediately distinguished by the narrower elytral fasciae, the apical elytral fasciae which are directed anteriorly along the suture, typically forming a "T" with the postmedian fasciae, the darker appendages, and the smaller, less robust form. From Clytus pacificus (Van Dyke), to which it seems morphologically closest, and the Californian species, C. blaisdelli Van Dyke and C. clitellarius (Van Dyke), C. chemsaki may be separated by the narrow, strongly arcuate antemedian elytral fasciae, which are directed anteriorly at the sutural and lateral margins, the configuration of the apical markings, the dense bands of appressed pubescence on the fourth and fifth abdominal sternites in both sexes, and the pale yellowish-white appressed pubescence in the male.

Biology.—The type series of Clytus chemsaki was collected in the late afternoon from the blossoms of Ceanothus sp. on the steep north slope of Mt. Wilson in the San Gabriel Mountains. The larval host for this species is not yet known, but it probably infests dead branches of coniferous trees.

ACKNOWLEDGMENTS

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